



IOWAccess Advisory Council

IOWAccess Revolving Fund Project Application

Proposing agencies should complete and submit Parts I, II and III to request Design approval, then complete and submit Parts IV and V to request Implementation approval.

Part I - Project Information

Date:	02/26/2010
Agency Name:	Information Security Office
Project Name:	Cybersecurity Awareness Training System
Agency Manager:	Alison Radl
Agency Manager Phone Number / E-Mail:	515-725-2019 / Alison.Radl@iowa.gov
Executive Sponsor (Agency Director or Designee):	Jeff Franklin - CISO
Initial Total for Design:	\$ 30,000
Initial Total for Implementation:	\$ 50,000
Initial Total for all Phases of Project, if Multi-Phased:	\$ 80,000
Project Timeline: (estimate start and end dates for project spending)	Design Start Date: 03/15/2010 Design End Date: 05/07/2010 Implementation Start Date: 05/10/2010 Implementation End Date: 09/30/2010
Revised Total for Design and Implementation:	\$ 80,000
Revised Total for all Phases of Project, if Multi-Phased:	\$ 100,000 (included Scope)

Part II - Project Overview

A. Project Summary: Describe the nature and use of the proposed project, including what is to be accomplished, how it will be accomplished, and what the costs and benefits will be.

Response: Security awareness training delivered via a web-based delivery system to provide organizations and individuals the tools they need to prevent security incidents and identity theft. Cyber security incidents, both accidental and intentional, are a growing problem. State and local governments, as well the public, are at risk. A 2006 Federal Trade Commission study estimated that identity theft affected 3.7 % of the population. If that trend continues over 100,000 Iowans could become victims of identity theft each year.

Security incidents are costly with the average out of pocket expense estimated at \$496 per incident. The total cost to Iowa is estimated to be \$49.6 million per year.

Identity theft resulting from a security incident also has non-financial effects such as:

- Damage to credit history,
- Harassment by collection agents
- Denial of credit

The costs to organizations are even higher. According to the 4th annual data breach study performed by the Ponemon institute, security incidents for organizations are estimated at \$202 per stolen record. Since 2005, over 250 million records have been reported stolen.

The goal of this proposal is to promote information security awareness in state and local government as well as the general public. Schools, cities and counties are often not able to employ full time security staff or provide security awareness training. Security awareness training delivered via a web-based delivery system will provide organizations and individuals the tools they need to prevent security incidents and identity theft.

B. Strategic Plan: How does the proposed project fit into the strategic plan of the requesting agency?

Response: The Information Security Office strategic plan identifies education as one of its core functions. The ISO seeks to “Promote information security awareness through education, outreach and research.” In support of this goal the ISO:

- Sponsors and provides training.
- Promotes security awareness among citizens, local government, and schools.

The Cybersecurity Awareness Training System will provide cyber security awareness training for state agencies, school districts, cities and counties as well as the general public.

C. Current Technology: Provide a summary of the technology used by the current system. How does the proposed project impact the agency’s technological direction? Are programming elements consistent with a Service Oriented Architecture (SOA) approach? Are programming elements consistent with existing enterprise standards?

Response: Moodle (Modular Object-Oriented Dynamic Learning Environment) is an Open Source Course Management System (CMS), also known as a Learning Management System (LMS) or a Virtual Learning Environment (VLE). It has become very popular among educators around the world as a tool for creating online dynamic web sites for their students. Moodle is provided freely as [Open Source](#) software (under the [GNU Public License](#)). This means Moodle is copyrighted, but you are allowed to copy, use and modify Moodle. ENTAA (Enterprise Authentication and Authorization) will be incorporated for LDAP, ID retrieval and password changes. Course content modules will be produced using HTML and XML that will conform to web standards for usability and functionality.

D. Statutory or Other Requirements

1. Is this project or expenditure necessary for compliance with a Federal law, rule, or order?

- YES (If "Yes", cite the specific Federal law, rule or order, with a short explanation of how this project is impacted by it.)

Response:

2. Is this project or expenditure required by state law, rule or order?

- YES (If "YES", cite the specific state law, rule or order, with a short explanation of how this project is impacted by it.)

Response:

3. Does this project or expenditure meet a health, safety or security requirement?

- YES (If "YES", explain.)

Response:

4. Is this project or expenditure necessary for compliance with an enterprise technology standard?

X YES (If "YES", cite the specific standard.)

Response: The State of Iowa Enterprise Information Security Standard requires employees of participating agencies to complete annual security awareness training.

http://das.ite.iowa.gov/standards/documents/080318_information_security.pdf .

Training: Each agency will implement a security awareness/training program for all staff. New employees will be provided basic information technology security training within three months of employment. Additional training, commensurate with the employee's work duties, will be provided annually.

[This section to be scored by application evaluator.]

Requirements/Compliance Evaluation (15 Points Maximum)

If the answer to these criteria is "no," the point value is zero (0). Depending upon how directly a qualifying project or expenditure may relate to a particular requirement (federal mandate, state mandate, health-safety-security issue, or compliance with an enterprise technology standard), or satisfies more than one requirement (e.g. it is mandated by state and federal law and fulfills a health and safety mandate), 1-15 points awarded.



E. Impact on Iowa's Citizens

- 1. Project Participants** - List the project participants (i.e. single agency, multiple agencies, State government enterprise, citizens, associations, or businesses, other levels of government, etc.) and provide commentary concerning the nature of participant involvement. Be sure to specify who and how many **direct** users the system

will impact. Also specify whether the system will be of use to other interested parties: who they may be, how many people are estimated, and how they will use the system.

Response: Participants will learn ways to keep computers and information safe through course modules topics including but not limited to; viruses, PC security, firewalls, use of strong passwords, social engineering, physical security of personal and business related information and identity threats.

State Employees	54,547 possible participants
City and County Employees	127,786 possible participants
School District Employees	36,446 possible participants
Public	100,000 possible participants

2. Service Improvements - Summarize the extent to which the project or expenditure improves service to Iowa citizens or within State government. Included would be such items as improving the quality of life, reducing the government hassle factor, providing enhanced services, improving work processes, etc.

Response:

3. Citizen Impact – Summarize how the project leads to a more informed citizenry, facilitates accountability, and encourages participatory democracy. If this is an extension of another project, what has been the adoption rate of Iowa’s citizens or government employees with the preceding project?

Response:

4. Public Health and/or Safety – Explain requirements or impact on the health and safety of the public.

Response: Cybersecurity Awareness Training System participants will learn the basics of information security and will be able to better protect computer systems and data from identity theft.

[This section to be scored by application evaluator.]

Impact Evaluation (15 Points Maximum)

- Minimally directly impacts Iowa citizens (0-5 points).
- Moderately directly impacts Iowa citizens (6-10 points).
- Significantly directly impacts Iowa citizens (11-15 points).



[This section to be scored by application evaluator.]

Customer Service Evaluation (10 Points Maximum)

- Minimally improves customer service (0-3 points).
- Moderately improves customer service (4-6 points).
- Significantly improves customer service (7-10 points).



F. Scope

1. Is this project the first part of a future, larger project?

- YES (If "YES", explain.) X NO, it is a stand-alone project

Response:

2. Is this project a continuation of a previously begun project? No

- YES (If "YES", explain.)

Response:

[This section to be scored by application evaluator.]

Scope Evaluation (10 Points Maximum)

- This is the first year of a multi-year project / expenditure or project / expenditure duration is one year (0-5 points)
- The project / expenditure is of a multi-year nature and each annual component produces a definable and stand-alone outcome, result or product (2-8 points).
- This is beyond the first year of a multi-year project / expenditure (6-10 points)



The last part of this criteria involves rating the extent to which a project or expenditure is at an advanced stage of implementation and termination of the project / expenditure would waste previously invested resources.

G. Source of Funds

On a fiscal year basis, how much of the total project cost (\$ amount and %) would be absorbed by your agency from non-Pooled Technology/IOWAccess funds? If desired, provide additional comment / response below.

Response:

[This section to be scored by application evaluator.]

Funds Evaluation (5 Points Maximum)

- 0% (0 points)
- 1%-12% (1 point)
- 13%-25% (2 points)
- 25%-38% (3 points)
- 39%-50% (4 points)
- Over 50% (5 points)



Part III – Design Proposal

Amount of Design Funding Requested: \$ 30,000.00

A. Process Reengineering

1. Provide a *pre-project or pre-expenditure* (before implementation) description of the impacted system or process. Be sure to include the procedures used to administer the impacted system or process and how citizens interact with the current system.

Response: Online training or learning opportunities offered by state government is not available. The goal of this project is to offer Iowa citizens an opportunity to participate in cybersecurity awareness training that will be tailored to the needs of Iowa citizens in general and in particular for employees that provide services for Iowa citizens.

2. Provide a *post-project or post-expenditure* (after implementation) description of the impacted system or process. Be sure to include the procedures used to administer the impacted system or process and how citizens will interact with the proposed system. In particular, note if the project or expenditure makes use of information technology in reengineering traditional government processes.

Response: The new system will provide an easy to use and accessible one stop training area for cybersecurity awareness training and will be an authoritative source for information security information that is of concern and interest to all Iowans.

[This section to be scored by application evaluator.]

Reengineering Evaluation (10 Points Maximum)

- Minimal use of information technology to reengineer government processes (0-3 points).
- Moderate use of information technology to reengineer government processes (4-6 points).
- Significant use of information technology to reengineer government processes (7-10).



B. Timeline

Provide a projected timeline for the Design phase of the project. Include such items as **start date, projected end date**, planning, and database design. Also include the parties responsible for each item.

Start date: 3/12/10

Enterprise A&A for LDAP user authentication and password retrieval – DAS-ITE

Complete course module content – DAS-Information Security Office

Develop Course Module Mock Ups – Selected Vendor for Course module creation

Complete MOODLE configuration and set up – DAS-ISO and DAS-ITE

End date: 5/7/10

[This section to be scored by application evaluator.]

Design Timeline Evaluation (10 Points Maximum)

- The timeline contains several problem areas (0-3 points).
- The timeline seems reasonable with few problem areas (4-6 points).
- The timeline seems reasonable with no problem areas (7-10).



C. Spending Plan

Explain how the funds will be allocated.

Funding allocation:

1. Course Module Mock ups: 50 %
2. Code for A&A, MOODLE set up completion: 20%
3. Complete content for course modules: 30%

D. Tangible and/or Intangible Benefits

Respond to the following and transfer data to the Design Financial Benefit Worksheet, # 5 below and the Implementation Financial Benefit Worksheet, # IV E3, as necessary:

1. One Year Pre-Project Cost - This section should be completed only if state government operations costs are expected to be reduced as a result of project implementation. Quantify actual state government direct and indirect costs (personnel, support, equipment, etc.) associated with the activity, system or process prior to project implementation.

Describe One Year Pre-Project Cost: NA

Quantify One Year Pre-Project Cost: NA

	State Total
FTE Cost(salary plus benefits):	\$
Support Cost (i.e. office supplies, telephone, pagers, travel, etc.):	\$
Other Cost (expense items other than FTEs & support costs, i.e. indirect costs if applicable, etc.):	\$
Total One Year Pre-Project Cost:	\$

2. One Year Post-Project Cost - This section should be completed only if state government operations costs are expected to be reduced as a result of project implementation. Quantify actual state government direct and indirect costs (personnel, support, equipment, etc.) associated with the activity, system or process after project implementation.

Describe One Year Post-Project Cost: NA

Quantify One Year Post-Project Cost: NA

	State Total

FTE Cost(salary plus benefits):	\$
Support Cost (i.e. office supplies, telephone, pagers, travel, etc.):	\$
Other Cost (expense items other than FTEs & support costs, i.e. indirect costs if applicable, etc.):	\$
Total One Year Post-Project Cost:	\$

3. One Year Citizen Benefit - Quantify the estimated one year value of the project to Iowa citizens. This includes the "hard cost" value of avoiding expenses ("hidden taxes") related to conducting business with State government. These expenses may be of a personal or business nature. They could be related to transportation, the time expended on the manual processing of governmental paperwork such as licenses or applications, taking time off work, mailing, or other similar expenses. As a "rule of thumb," use a value of \$10 per hour for citizen time.

Describe savings justification:

<u>Transaction Savings</u>	
Number of annual online transactions:	
Hours saved/transaction:	
Number of Citizens affected:	
Value of Citizen Hour	\$
Total Transaction Savings:	\$
Other Savings (Describe)	\$
Total One Year Citizen Benefit :	\$

4. Opportunity Value/Risk or Loss Avoidance - Quantify the estimated one year non-operations benefit to State government. This could include such items as qualifying for additional matching funds, avoiding the loss of matching funds, avoiding program penalties/sanctions or interest charges, avoiding risks to health/security/safety, avoiding the consequences of not complying with State or Federal laws, providing enhanced services, avoiding the consequences of not complying with enterprise technology standards, etc

Response:

5. Design Financial Benefit Worksheet

A. Total One Year Pre-Project cost (Section III D1):	\$	
B. Total One Year Post-Project cost (Section III D2):	\$	
C. State Government Benefit (= A-B):		\$
D. One Year Citizen Benefit (Section III D3):		\$
E. Opportunity Value or Risk/Loss Avoidance Benefit (Section III D4):		\$
F. Total Design Benefit (C+D+E)	\$	
G. Annual Prorated Cost (From Budget Table, Section IV C):	\$	
Benefit / Cost Ratio: (F/G) =		
Return On Investment (ROI): ((F-G) / Requested Project Funds) * 100		

6. Benefits Not Readily Quantifiable - List and summarize the overall non-quantifiable benefits (i.e., IT innovation, unique system application, utilization of new technology, hidden taxes, improving the quality of life, reducing the government hassle factor, meeting a strategic goal, etc.).

Response:

[This section to be scored by application evaluator.]

Design Financial Evaluation (15 Points Maximum)

- The financial analysis contains several questionable entries and provides minimal financial benefit to citizens (0-5 points).
- The financial analysis seems reasonable with few questionable entries and provides a moderate financial benefit to citizens (6-10 points).
- The financial analysis seems reasonable with no problem areas and provides maximum financial benefit to citizens (11-15).



Part IV – Implementation Funding

Amount of Implementation Funding Requested: \$ 50,000.00

Amount of Hosting Requested: \$ 2,500.00

Note: Projects developed by DAS-ITE allow first year of hosting charges

A. Timeline

Provide a projected timeline for the Implementation phase of the project. Include such items as **start date**, coding, testing, deployment, conversion, parallel installation, and **projected date of final release**. Also include the parties responsible for each item.

Response:

Start date: 5/10/10

Complete course module questions and pass/fail criteria – DAS-Information Security Office

Code Course Module Mock Up Views – Selected Vendor for Course module creation

Configure Course Modules on MOODLE site – DAS-ISO and DAS-ITE

Testing with selected agencies and beta testers – DAS-ISO and DAS-ITE

Create/develop Training and Marketing materials – DAS-ISO and DAS-ITE

Training of HR representatives of City County School and State government agencies – DAS-ISO and DAS-ITE

Prepare Production environment – DAS-ISO and DAS-ITE

Prepare media materials – – DAS-Information Security Office

Launch application hold media event – DAS-ISO and DAS-ITE

End date: 9/30/10

[This section to be scored by application evaluator.]

Implementation Timeline Evaluation (10 Points Maximum)

- The timeline contains several problem areas (0-3 points).
- The timeline seems reasonable with few problem areas (4-6 points).
- The timeline seems reasonable with no problem areas (7-10).



B. Funding Requirements

On a fiscal year basis, enter the estimated cost by funding source: Be sure to include developmental costs and ongoing costs, such as those for hosting the site, maintenance, upgrades.

	Current FY		Current FY +1		Current FY +2	
	Cost(\$)	% Total Cost	Cost(\$)	% Total Cost	Cost(\$)	% Total Cost
State General Fund	\$0	0%	\$0	0%	\$0	0%
Pooled Tech. Fund /IOWAccess Fund	\$0	0%	\$0	0%	\$0	0%
Federal Funds	\$0	0%	\$0	0%	\$0	0%
Local Gov. Funds	\$0	0%	\$0	0%	\$0	0%

Grant or Private Funds	\$0	0%	\$0	0%	\$0	0%
Other Funds (Specify)	\$0	0%	\$0	0%	\$0	0%
Total Project Cost	\$0	0%	\$0	0%	\$0	0%
Non-Pooled Tech./Non-IOWAccess Total	\$0	0%	\$0	0%	\$0	0%

[This section to be scored by application evaluator.]
Implementation Funding Evaluation (10 Points Maximum)

- The funding request contains questionable items (0-3 points).
- The funding request seems reasonable with few questionable items (4-6 points).
- The funding request seems reasonable with no problem areas (7-10).



C. Project Budget Table

It is necessary to estimate and assign a useful life figure to each cost identified in the project budget. Useful life is the amount of time that project-related equipment, products, or services are utilized before they are updated or replaced. In general, the useful life of hardware is three (3) years and the useful life of software is four (4) years. Depending upon the nature of the expense, the useful life for other project costs will vary between one (1) and four (4) years. On an exception basis, the useful life of individual project elements or the project as a whole may exceed four (4) years.

The Total Annual Prorated Cost (State Share) will be calculated based on the following equation:

$$\left[\left(\frac{\text{Budget Amount}}{\text{Useful Life}} \right) \times \% \text{ State Share} \right] + (\text{Annual Ongoing Cost} \times \% \text{ State Share}) = \text{Annual Prorated Cost}$$

Budget Line Items	Budget Amount (1 st Year Cost)	Useful Life (Years)	% State Share	Annual Ongoing Cost (After 1 st Year)	% State Share	Annual Prorated Cost
Agency Staff	\$		%	\$	%	\$
Software	\$		%	\$	%	\$
Hardware	\$		%	\$	%	\$
Training	\$		%	\$	%	\$
Facilities	\$		%	\$	%	\$
Professional Services	\$		%	\$	%	\$
ITE Services	\$		%	\$	%	\$
Supplies, Maint., etc.	\$		%	\$	%	\$
Other	\$		%	\$	%	\$
Totals	\$		%	\$	%	\$

D. Spending plan

Explain how the funds will be allocated.

Funding allocation:

1. Coding Course Module views: 50 %
2. Testing and Training: 40%
3. Configuration and Launch: 10%

E. Tangible and/or Intangible Benefits

Respond to the following and transfer data to the Implementation Financial Benefit Worksheet, #3 below, as necessary:

1. Opportunity Value/Risk or Loss Avoidance – Quantify the estimated annual non-operations benefit to State government. This could include such items as qualifying for additional matching funds, avoiding the loss of matching funds, avoiding program penalties/sanctions or interest charges, avoiding risks to health/security/safety, avoiding the consequences of not complying with State or Federal laws, providing enhanced services, avoiding the consequences of not complying with enterprise technology standards, etc.

Response:

2. Benefits Not Readily Quantifiable – List and summarize the overall non-quantifiable benefits (i.e., IT innovation, unique system application, utilization of new technology, hidden taxes, improving the quality of life, reducing the government hassle factor, meeting a strategic goal, etc.).

Response:

3. Implementation Financial Benefit Worksheet

A. Total One Year Pre-Project cost (Section III D1):	\$	
B. Total One Year Post-Project cost (Section III D2):	\$	
C. State Government Benefit (= A-B):		\$
D. One Year Citizen Benefit (Section III D3):		\$
E. Opportunity Value or Risk/Loss Avoidance Benefit (Section III D4):		\$
F. Total Design Benefit (C+D+E)	\$	
G. Annual Prorated Cost (From Budget Table, Section IV C):	\$	
Benefit / Cost Ratio: (F/G) =		
Return On Investment (ROI): ((F-G) / Requested Project Funds) * 100		

[This section to be scored by application evaluator.]

Implementation Financial Evaluation (15 Points Maximum)

- The financial analysis contains several questionable entries and provides minimal financial benefit to citizens (0-5 points).
- The financial analysis seems reasonable with few questionable entries and provides a moderate financial benefit to citizens (6-10 points).
- The financial analysis seems reasonable with no problem areas and provides maximum financial benefit to citizens (11-15).



Part V – Auditable Outcome Measures

For each of the following categories, list the auditable metrics for success after implementation and identify how they will be measured.

1. Improved customer service

Response:

2. Citizen impact

Response:

3. Cost Savings

Response:

4. Project reengineering

Response:

5. Source of funds (Budget %)

Response:

6. Tangible/Intangible benefits

Response:

Evaluation Summary

[This section to be completed by application evaluator.]

Design Phase:

Requirements/Compliance Evaluation (15 Points Maximum)	<input type="checkbox"/>
Impact Evaluation (15 Points Maximum)	<input type="checkbox"/>
Customer Service Evaluation (10 Points Maximum)	<input type="checkbox"/>
Scope Evaluation (10 Points Maximum)	<input type="checkbox"/>
Funds Evaluation (5 Points Maximum)	<input type="checkbox"/>
Reengineering Evaluation (10 Points Maximum)	<input type="checkbox"/>
Design Timeline Evaluation (10 Points Maximum)	<input type="checkbox"/>
Design Financial Evaluation (15 Points Maximum)	<input type="checkbox"/>
<u>TOTAL DESIGN EVALUATION</u> (90 Points Maximum)	<input type="checkbox"/>

Implementation Phase:

Implementation Timeline Evaluation (10 Points Maximum)	<input type="checkbox"/>
Implementation Financial Evaluation (15 Points Maximum)	<input type="checkbox"/>
Implementation Funding Evaluation (10 Points Maximum)	<input type="checkbox"/>
<u>TOTAL IMPLEMENTATION EVALUATION</u> (35 Points Maximum)	<input type="checkbox"/>